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- Real-time test system comprising at least one reservoir with monoclonal
 anti-insulin or anti-C peptide capture antibodies solidified in said reservoir,
 which reservoir is capable to receive a sample; a wash solution; labelled
 monoclonal anti-insulin or anti-C peptide antibodies useful as a tracer,
 wherein the label allows photometrical detection; and at least one
 photomultiplier detector.
- 2. Test system according to claim 1, wherein the labelled monoclonal antiinsulin or anti-C peptide is present in dried form in the said reservoir.
- 3. Test system according to claim 1, wherein the said labelled monoclonal anti-insulin or anti-C peptide antibodies are labelled by a chemiluminescent label.
 - 4. The system of claim 1, wherein the reservoir is a microtiter well.
- 5. A method for determining insulin levels in a sample, comprising adding the sample to a reservoir with monoclonal anti-insulin or anti-C peptide capture antibodies solidified in said reservoir, and labelled monoclonal anti-insulin or anti-C peptide antibodies useful as a tracer, followed by incubation giving labelled insulin complexes; washing; and detecting the labelled insulin complexes photometrically.
- 6. The method of claim 5, wherein the sample is perfusion solution obtained from a pancreas removed from the body after stimulating said pancreas with an insulin-production influencing compound, preferably glucose.
 - 7. The method of claim 5, wherein the sample is supernatant of in vitro cultured beta cells.
 - 8. The method of claim 5, wherein the sample is a blood sample.
- 9. A method for determining insulin levels, comprising sampling blood in the Vena splenica and/or Vena porta, comprising the steps of introducing a probe in one of said veins, sampling at one or more spots in the said vein, and analysing the samples using the method of claim 5.

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- 10. System for carrying out the method of claim 9 comprising a probe arranged to be introduced in the *Vena splenica* and/or *Vena porta* and the test system of claim 1.
- 11. System for carrying out the method of claim 9 comprising a probe arranged to be introduced in the *Vena splenica* and/or *Vena porta* and the test system of claim 2.
 - 12. System for carrying out the method of claim 9 comprising a probe arranged to be introduced in the *Vena splenica* and/or *Vena porta* and the test system of claim 3
- 13. System for carrying out the method of claim 9 comprising a probe arranged to be introduced in the *Vena splenica* and/or *Vena porta* and the test system of claim 4.